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(54) Title: PURIFYING PROCESS OF SOLUBLE PROTEINS OF THE L. OBLIQUA BRISTLES THROUGH PROTHROMBIN ACTIVATION; PROCESS FOR A PARTIAL DETERMINATION OF THE AMINO ACIDS SEQUENCE OF THE PROTHROMBIN ACTIVATOR; PROCESS FOR DETERMINING THE PROTHROMBIN ACTIVATION OF FRACTION II, N-TERMINAL AND INTERNAL FRAGMENTS SEQUENCES



(57) Abstract: The herein invention refers to a purifying process of soluble proteins of the L. obliqua bristles through prothrombin activation; a partial determination of the amino acids sequence of the prothrombin activator, a process for determining the fraction II of the prothrombin activation as well as the N-terminal sequence and the sequence of internal fragments of the prothrombin activator fraction, the prothrombin activator and the utilization of the prothrombin activator through the homogenization of the L. obliqua bristles. The herein invention has shown that only one component of the Lonomia obliqua venom, the Lopap, causes the hemorrhagic syndrome directly by activating prothrombin and, therefore, a patient should be conducted to a therapy when in contact with the Lonomia obliqua venom. According to the herein invention, Lopap is a new prothrombin activator, showing to be a quite important factor responsible for consumption coagulopathy, found in patients exposed to the venom of the L. obliqua caterpillar. In low doses of purified protein, due to its capacity of activating prothrombin and generating thrombin, it is possible, in controlled conditions, to withdraw fibrinogen from circulation, transforming it in fibrin microthrombs. The decrease on the concentration of plasmatic fibrinogen promotes the increasing of blood coagulation time and therefore it will avoid acute vascular thrombosis. Since protein does not present proteolytic activity, it could maintain the coagulating capacity of the fibrinogen not consumed in the process. The fibrinogen plasmatic concentration would decrease, however there would not be predisposition for hemorrhagic state. Besides that, it could be used to produce diagnosis KITS for detecting dysprothrombinemias.